

# BUILDING THE FUTURE AT THE UNIVERSITY OF RHODE ISLAND

## Research, Innovation & Economic Growth

### URI Commission for Research & Innovation

#### *Executive Summary of Commission Report and Recommendations*

Research universities provide businesses with the tools they need to compete in the global innovation economy and stimulate economic development through the creation of high-wage jobs. Public research institutions also provide access to higher education—an increasingly important aspect of producing an educated workforce ready for the 21st-century economy.

Recognizing the importance of the University of Rhode Island (URI) to economic development in Rhode Island, the Rhode Island Science and Technology Advisory Council (STAC) recommended the creation of a Commission to evaluate URI's research enterprise, with an aim toward helping URI strengthen its position as a nationally competitive research institution and as a key institution in Rhode Island's efforts to create an innovation economy. In 2006, the Rhode Island General Assembly passed, and Governor Donald L. Carcieri then signed into law, legislation creating the URI Commission for Research & Innovation.

*The Commission was asked to evaluate URI's current position and formulate recommendations to:*

- Grow the size, significance and competitiveness of URI's R&D programs;
- Produce a larger, better trained workforce in science and technology; and
- Increase the levels of industry involvement in URI's research programs and technology transfer/commercialization activities.

#### **URI'S CURRENT POSITION**

The Commission used a comprehensive set of comparative indicators developed by The Center for Measuring University Performance, together with indicators recommended by the Commissioners, university research experts, and URI faculty members and administrators to assess URI's current position.

On most measures, URI lags far behind in building research capacity. Most significantly, URI did not experience the research growth over the past decade that fueled new capacity at other universities. According to the National Science Foundation, federal R&D expenditures increased by 117 percent from 1996 to 2006. URI's federal research funding grew by just 29 percent, while neighboring public research university peers more than doubled their federal research funding. By not keeping pace with the overall growth in R&D, URI lost a great deal of its market share of research funding—even though much of the federal academic R&D funding awarded in this period supported research in fields in which URI has a solid foundation of expertise.

To emerge as a nationally competitive research institution, URI must make progress on virtually all fronts. Incremental changes will not be sufficient to drive this transformation. Rather, URI, its leadership, and state leadership must commit to making bold changes and creating the conditions necessary to significantly enhance research and innovation capacity at URI.

## Research & Development Expenditures, 2006

	URI	UVM	UNH	UConn	UH-M	ASU	UMICH
Rank by total R&D expenditures	145	116	118	78	68	81	4
Total R&D expenditures	\$70.7m	\$121.8m	\$115.1m	\$215.2m	\$249.6m	\$202m	\$800.5m
Federal research expenditures	\$46.9m	\$82.5m	\$86.4m	\$124.8m	\$202.4m	\$109.9m	\$565.8m
Federal as % of total R&D expenditures	66%	68%	75%	58%	81%	54%	71%

Source: National Science Foundation

### CREATING A NATIONALLY COMPETITIVE PUBLIC RESEARCH UNIVERSITY AT URI

The Commission believes that URI can and must become a nationally competitive public research university. Meeting this objective will involve addressing three fundamental issues: leadership and culture, modernization and flexibility, and building research capacity.

**Leadership and culture** means having visionary, experienced champions of research—within statewide governance, within institutional leadership, and at the School and College levels—to envision, fund, and guide this growth and transformation. The champions must foster a research-friendly institutional culture that encourages and rewards research and scholarship at every level.

**Modernization and flexibility** means undertaking major changes to policies, practices and procedures that currently stymie rather than support research. It also entails developing a sustainable financial model for the university to support a stronger research-based institution.

**Building research capacity** for a research enterprise of competitive size and scale means adding significant numbers of new research faculty, attracting top researchers with financial and intellectual incentives, aggressively pursuing grant opportunities and private sector partnerships to raise the total levels of research funding, and raising non-tuition revenue to support the research enterprise.

#### Specific measurable benchmarks for this transformation are:

- Achieve a “Research University/Very High Activity” designation from the Carnegie Foundation by 2015.

- Double total levels of research and development funding in the next five years, achieving total research funding of \$140 million annually by 2015.
- Achieve measurable economic impact in Rhode Island through the development of a technology-oriented workforce, technology transfer, and greater collaboration with industry.

#### The Commission’s three priority recommendations are:

1. Attract a new President with demonstrated experience in building university-based research capacity, and who is capable of leading a transformative change effort at URI.
2. Create a sustainable financial model for URI that provides university leadership and the Board of Governors for Higher Education with the flexibility to make necessary investments in building research capacity.
3. Jump-start URI’s research capacity with a \$100-million public investment through a bond initiative to capitalize the attraction of 20-30 world class research faculty, and to provide state matching funds to catalyze federal research grant procurement efforts.

(See report for full set of recommendations.)

### NEXT STEPS

To sustain the effort necessary to bring the Commission’s recommendations forward, STAC is partnering with the Rhode Island Board of Governors for Higher Education and has established an implementation committee. The committee will work closely with state leaders, URI leadership and URI faculty to ensure the necessary commitment to making URI a nationally competitive research institution.